Listing of Claims:

This listing of claims will replace all prior versions, and listings, of claims in the application.

- 1. (currently amended) A purified preparation of mammalian hemangioblast cells which (i) is capable of proliferation in an *in vitro* culture for more than 40 generations, (ii) does not induce tumor formation in an immunodeficent Rag1 deficient immunodeficient Rag1-deficient mouse, (iii) maintains the potential to differentiate to hematopoietic and endothelial cells throughout the duration of said culture, and (iv) wherein the cells are inhibited from differentiation when cultured on a gelatinized, feeder-free layer.
- 2. (currently amended) The preparation of claim 1, wherein the cells are not immunoreactive with do not express CD34, PECAM-1 (or CD31), Flk-1, Tie-2, Sca-1, Thy-1 and P-selectin markers as detected by immunohistochemical staining.
- 3. (original) The preparation of claim 1 wherein the cells are human.
- 4. (original) The preparation of claim 2 wherein the cells are human.
- 5. (withdrawn currently amended) The preparation of claim 1 wherein the mammalian hemangioblast cells are mouse embryonic cell line deposited under ATCC PTA-4300.
- 6. (withdrawn currently amended) A method of preparing a mammalian hemangioblast cell line the mammalian cells as defined in claim 1, comprising the steps of: (i) culturing on a feeder layer a cell source selected from the group consisting of a delayed mammalian blastocyst, an early post-implantation embryo together with its extra-embryonic tissues, an embryonic stem cell-derived embryoid body, and bone marrow tissue, (ii) selecting colonies of adherent fibroblastic cells with loosely attached rapidly dividing round cells having ring-like cells at their edges, and (iii) testing cells in the selected colonies for ability to differentiate into both endothelial and hematopoietic cells.
- 7. (withdrawn) The method as claimed in claim 6, wherein the cell source is bone marrow tissue, and further comprising the step of harvesting bone marrow tissue which retains integrity in tissue clumps prior to the step of culturing.

- 8. (withdrawn) The method as claimed in claim 6, wherein the cell source is human.
- 9. (withdrawn) The method as claimed in claim 7, wherein the cell source is human.
- 10. (withdrawn) The method as claimed in claim 6, further comprising maintaining the selected cells on a gelatinized feeder-free layer to inhibit differentiation.
- 11. (withdrawn) The method as claimed in claim 7, further comprising maintaining the selected cells on a gelatinized feeder-free layer to inhibit differentiation.
- 12. (canceled)
- 13. (withdrawn currently amended) A method for inducing formation of new blood vessels in an ischemic tissue in a patient in need thereof, comprising administering to said patient an effective amount of the purified preparation of mammalian hemangioblast cells according to claim 3 to induce new blood vessel formation in said ischemic tissue.
- 14. (withdrawn currently amended) A method of The method as claimed in claim 8, for enhancing blood vessel formation in a patient in need thereof, comprising: (i) selecting the patient in need thereof; (ii) isolating human hemangioblast cells according to the method of claim 8 obtaining the cells as defined in claim 1; and (iii) administering the hemangioblast cells to the patient.
- 15. (withdrawn currently amended) A method The method as claimed in claim 8, for treating an injured blood vessel in a patient in need thereof, comprising: (i) selecting the patient in need thereof; (ii) isolating human hemangioblast cells according to the method of claim 8 obtaining the cells as defined in claim 1; and (iii) administering the hemangioblast cells to the patient.
- 16. (withdrawn) A method of delivering a therapeutic gene to a patient having a condition amenable to gene therapy comprising: (i) selecting the patient in need thereof; (ii) modifying the preparation of claim 3 so that the cells of the preparation carry a therapeutic gene; and (iii) administering the modified preparation to the patient.

- 17. (withdrawn) A commercial package comprising the preparation of claim 3 wherein the preparation has been modified so that the cells of the preparation carry a therapeutic gene, and instructions for treating a patient having a condition amenable to treatment with gene therapy.
- 18. (new) The preparation of claim 1 wherein the cells are from a single clone.
- 19. (new) A method of preparing the mammalian cells as defined in claim 18, comprising the steps of: (i) culturing on a feeder layer a cell source selected from the group consisting of a delayed mammalian blastocyst, an early post-implantation embryo together with its extraembryonic tissues, an embryonic stem cell-derived embryoid body, and bone marrow tissue, (ii) selecting colonies of adherent fibroblastic cells with loosely attached rapidly dividing round cells having ring-like cells at their edges, and (iii) testing cells in the selected colonies for ability to differentiate into both endothelial and hematopoietic cells.

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